

## MINIATURE RECTIFIERS

REVERSE VOLTAGE - 200 to 800Volts  
FORWARD CURRENT - 1.0 Amperes

### FEATURES

- Low cost
- Diffused junction
- Ultra fast switching for high efficiency
- Low reverse leakage current
- Low forward voltage drop
- High current capability
- The plastic material carries UL recognition 94V-0

### MECHANICAL DATA

- Case: JEDEC DO-41 molded plastic
- Polarity: Color band denotes cathode
- Weight : 0.012 ounces, 0.34 grams
- Mounting position: Any

### DO-41



Dimensions in inches and (millimeters)

### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60Hz, resistive or inductive load.

For capacitive load, derate current by 20%

CHARACTERISTICS	SYMBOL	BY134	BY135	UNIT
Maximum Non-Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	800	200	V
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	800	200	V
Maximum RMS Voltage	V <sub>RMS</sub>	560	140	V
Maximum DC Blocking Voltage at T <sub>A</sub> =150°C	V <sub>DC</sub>	800	200	V
Maximum Average Forward Rectified Current 375" (9.5mm) Lead Lengths at @T <sub>A</sub> =75°C	I <sub>(AV)</sub>	1.0		A
Peak Forward Surge Current 10ms Single Half Sine-Wave Super Imposed on Rated Load @ T <sub>A</sub> =25°C	I <sub>FSM</sub>	30		A
Maximum Instantaneous Forward Voltage at 1.0A @ T <sub>A</sub> =25°C	V <sub>F</sub>	1.1		V
Maximum DC Reverse Current @T <sub>A</sub> =25°C at Rated DC Blocking Voltage @T <sub>A</sub> =150°C	I <sub>R</sub>	5.0	500	μA
Typical junction Capacitance (Note1 )	C <sub>J</sub>	15.0		pF
Typical Thermal Resistance (Note 2)	R <sub>θJA</sub>	25.0		°C/W
Operating Temperature Range	T <sub>J</sub>	-55 to+125		°C
Storage Temperature Range	T <sub>STG</sub>	-55 to+150		°C

NOTE:1.Measured at 1.0 MHz and applied reverse voltage of 4.0V DC.

2.Thermal Resistance from Junction of ambient at.375" (9.5mm) lead lengths. P.C.board mounted.

FIG. 1 – FORWARD CURRENT DERATING CURVE

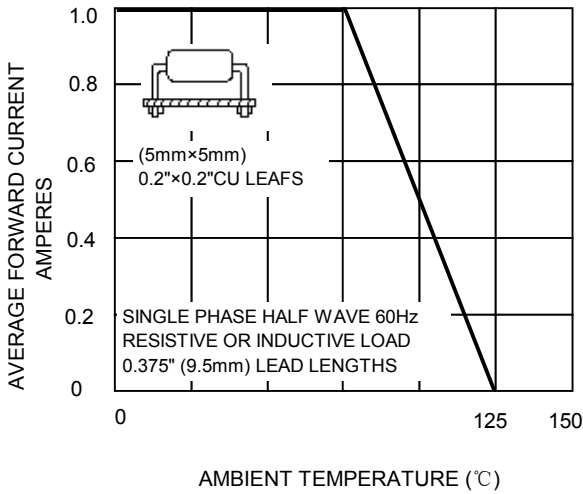


FIG.2-TYPICAL FORWARD CHARACTERISTICS

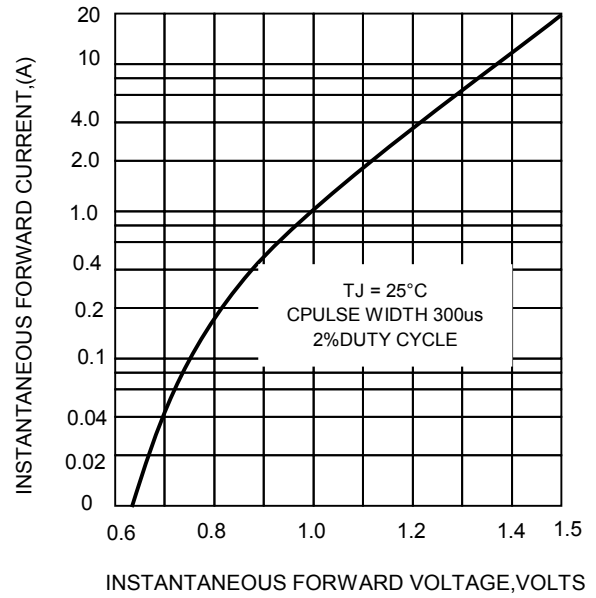


FIG. 3 – MAXIMUM NON-REPETITIVE SURGE CURRENT

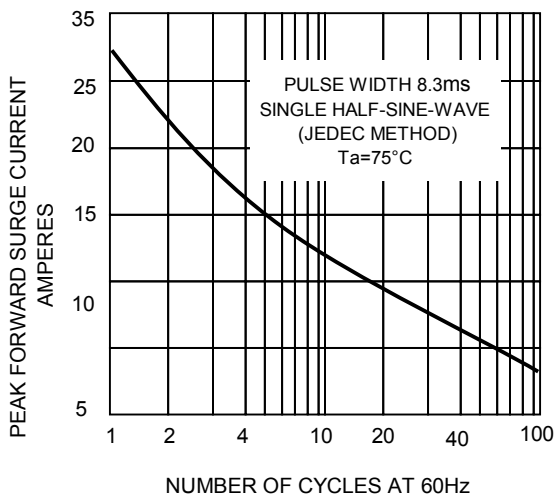


FIG. 4 – PEAK FORWARD SURGE CURRENT AMPERES

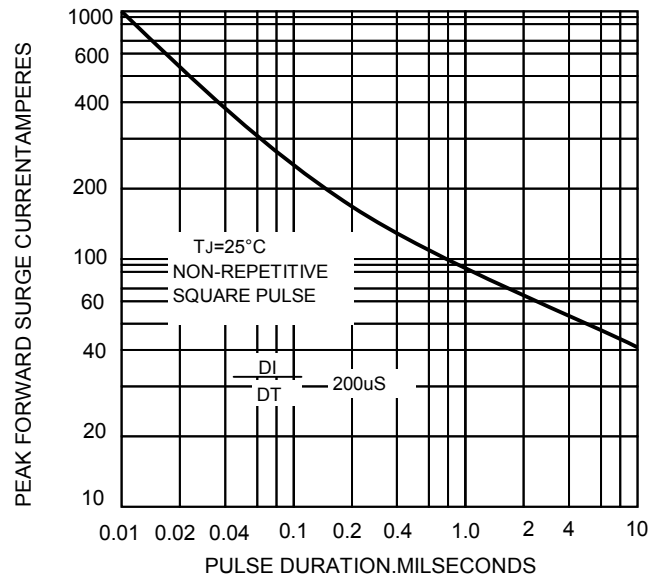


FIG.5 – TYPICAL JUNCTION CAPACITANCE

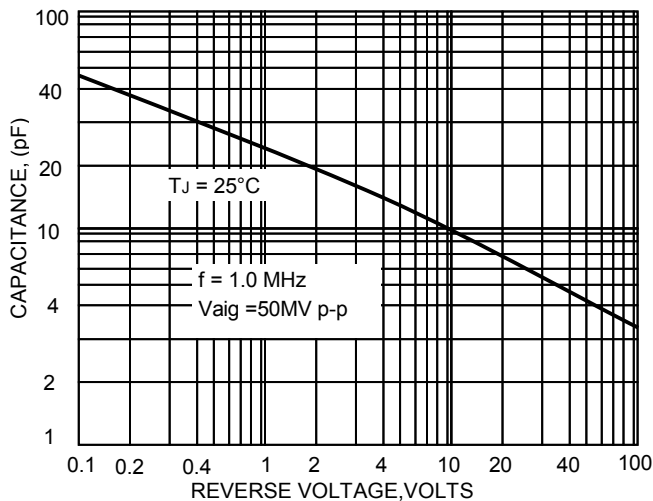


FIG.6-TYPICAL REVERSE CHARACTERISTICS

